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**Title:** Studying the Incommensurability that Unites Us: Persuasion across Discourse Communities, Persuasion Via Boundary Objects

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Studying the Incommensurability that Unites Us: Persuasion across Discourse Communities, Persuasion Via Boundary Objects  
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In the science studies literature the theoretical construct of boundary objects has been developed to explain how diverse communities clustered around a scientific subject area cooperate to advance that area. Boundary objects are "scientific objects that inhabit several intersecting social worlds . . . and satisfy the informational requirements of each of them" (Star and Griesemer 393). Star and Griesemer's foundational article showed that these objects can be shared by communities ranging from academic researchers to amateur enthusiasts, administrators, philanthropists, and technicians. While each community understands the object differently, there is enough commonality in the understanding of the object to unite these distinct social worlds and facilitate cooperation among them.

In the rhetorical studies literature, the theoretical construct of discourse communities has sought to explain both how distinct social worlds develop a language that facilitates communication and understanding within communities, and also how community-specific language can problematize communication and understanding between groups. Herndl, Fennel, and Miller argued that technical catastrophes like those at Three Mile Island and the explosion of the shuttle Challenger can be traced to the difficulty of communication between discourse communities. At the heart of the Herndl, Fennel, and Miller article is the suggestion that discourse communities also demarcate ideologies and professional worldviews, which highlights the problem of persuading individuals from a different discourse community to believe or act in ways that make sense in your own worldview. While Herndl, Fennel, and Miller rebuffed critics (See for example Walzer and Gross.) who claimed that the article meant that persuasion and rhetoric were impossible, the question remains how persuasion is possible given the communication difficulties that they show in their research.

This paper will examine how the concept of boundary objects that unite communities can inform our understanding of persuasion across discourse communities. I will focus on the efforts of two individuals associated with the community in and around Los Alamos National Laboratory (LANL). One individual, John Bartlit, has for the last few decades worked tirelessly as an engineer at LANL (an entity that engenders environmental concerns for many in Northern New Mexico) and as a spokesperson for New Mexico Citizens for Clean Air and Water (a state environmental advocacy group). His efforts at environmental advocacy have involved more than code-switching (i.e., talking like an engineer to industrial interests and like an environmentalist to green interests). He has made concerted efforts to speak sensibly to both communities, avoiding the loaded language that would allow either side to

dismiss his discourse. The second individual is Ed Grothus, a former LANL machinist who since retiring from the laboratory has become an anti-nuclear and peace advocate. An idealist of grand proportions, he writes to newspapers and to elected officials to comment on national security and nuclear policy, he creates sculptures and public art that attempt to persuade the community of the folly of nuclear weapons, and he tirelessly engages the people he encounters around town in discussions on the same topics.

In this paper I will examine the boundary objects that unite the New Mexico environmental community and the Los Alamos community (a community that is geographically, socially, and economically intertwined with the Laboratory) and how Bartlett and Grothus deploy or play off of those objects to persuade the members of intersecting discourse communities/social worlds to new beliefs. I will also compare the concept of boundary objects to the classical rhetorical concept of commonplaces. This project should shed light on the problem of incommensurability, especially between technical groups.